REMARKS

Reconsideration and allowance are respectfully requested.

In the Office action, the examiner has omitted examination of claims 17 and 24 on the basis that their recitations are not shown in the elected species of figure 2. Applicant requests reconsideration of this conclusion. Claims 17 is directed to the reduced area portions of the seal lands with these portions being positioned directly opposite one another. This is clearly shown in figure 2. Claim 23 is directed to a yoke as the connecting means and this is also clearly shown at 54 in figure 2. These claims are included in the claims above.

The informalities in claim 1 have been corrected above and typographical error in the specification at page 10 has also been corrected.

Claims 1, 23, 26 and 27 stand rejected as anticipated by the patent to Bainachi while claims 1, 3, 6 and 7, stand rejected as obvious over this reference further in view of Whitford. Claims 4 and 5 are rejected over this combination of references and further in view of the patent to Tong.

In response, claim 1 has been amended to more clearly distinguish the invention from the references of record in both a novel and that obviousness sense. In particular, claim 1 now specifies that the recited ones of the seal lands and the nonrotating structure define a first chamber which is permanently connected to one of the pressure zones and a second chamber is defined by the connecting means and the first and second seal lands with these elements being imperforate so that these chambers are always isolated from each other.

None of the references of record and particularly Bainachi discloses or suggests this arrangement. In Bainachi, as described at column 3, line 59 to column 4, line 30, movement of the rotor plate 6 in an axial direction results in a a change in pressure in the peripheral chamber 5 so that what was at low-pressure is now exposed to high pressure. High pressure is allowed to expand between the joints 14b and 16b resulting in movement of the body to the left as viewed in figure 2. The high pressure between the seals 14b and 16b push the first and second lands 8a and 8b back. If the first and second lands 8a and 8b move to

the right, then the intermediate pressure in the yoke 10 and chamber 5 is reinforced by high pressure fluid from the high pressure region. As a consequence, the high pressure zone and the low-pressure zones are not always on opposite sides of the seal member 13at or 13b and the high pressure zone does not always extend around the yoke 10. As a consequence of this structure, a more complex seal is required and the mounting of the yoke and lands, provided by the seals 13a and 13b results in high fraction which can result in unsatisfactory sealing. In clear contrast, as now emphasized in claim 1, the chamber around the yoke is permanently connected to the high pressure zone or the low-pressure zone and this does not change during the operation of the engine. Thus, the elements of the seal are not subjected to undue amounts of friction.

The patents to Whitford and Tong were cited for subsidiary features and do not remedy the foregoing deficiency in Bainachi.

Having addressed each of the points set out in the Office action, favorable reconsideration is solicited.

Respectfully submitted,

Reg. No. 25647

Customer No. 20736
Fax 202 887 0336